

SIGNATURE RECOGNITION SYSTEM AND METHOD

ABSTRACT OF THE DISCLOSURE

5 A method of authenticating a signature including the steps of sampling a signature and storing data representative of the signature, converting the data to high dimensions vectors, feeding the high dimension vectors to an unsupervised neural network, performing a high order principal component extraction process on the high dimensions vectors to thereby identifying clusters of high dimension points, and analyzing the clusters of high dimension points to determine, based on previously stored information, the authenticity of the signature. Also an apparatus for such authentication including a sampling device for sampling a signature and storing data
10 representative of the signature, a converting device connected downstream of the sampling device for converting the data to high dimension vectors, an unsupervised neural network for receiving the high dimension and performing a high order principal component extraction process on the high dimensions vectors to thereby identify clusters of high dimension points, and an analyzing device connected to the
15 unsupervised neural network for analyzing the clusters of high dimension points to determine the authenticity of the signature.